AMENDMENTS TO THE CLAIMS

This listing of claims replaces all prior versions, and listings, of claims in the application:

Listing of Claims:

1. (Currently Amended) In a system where a broadcast is output across a medium having a fixed bandwidth to individual home entertainment systems, the broadcast included a plurality of channels of viewable moving image data, a method for optimizing the use of the fixed bandwidth by dynamically restructuring the broadcasting of the plurality of channels based on feedback from at least some of the home entertainment systems, the method comprising the steps for:

upon the occurrence of an event at a first home entertainment system, initiating usage tracking for a selected type of ~~how~~ viewable moving image data usage for viewable moving image data of a selected channel, ~~from among the plurality of channels, is being used at the~~ selected type of viewable moving image data usage being selected from among a plurality of different types of viewable moving image data usage that can be tracked each time one of the plurality of different types of viewable moving image data usage are utilized at the first home entertainment system;

in response to the event, tracking a utilization of the selected type of ~~identifying information related to how the~~ viewable moving image data usage, from among the plurality of different types of viewable moving image data usage, for the moving image data ~~is being used~~ at the first home entertainment system by generating user behavior information to indicate that the selected type of viewable moving image data usage is utilized;

coupling the event with the ~~identified information to~~ generated user behavior information for the first home entertainment system, ~~the user behavior information describing how the first home entertainment system is using the viewable moving image data~~;

combining the event and the generated user behavior information from the first home entertainment system with events and corresponding generated user behavior information from other home entertainment systems, the other home entertainment systems ~~that corresponds to the~~ also utilizing a type of viewable moving image data usage selected from among the plurality of different types of viewable moving image data usage for the selected channel, wherein the other home entertainment centers also track each time one of the plurality of different types of viewable moving image data usage is utilized in response to a corresponding event ~~user behavior information from other home entertainment systems includes events used to initiate usage tracking of the viewable moving image data at the other home entertainment systems coupled to corresponding identified information related to how the other home entertainment systems are using the viewable moving image data, the user behavior information from other home entertainment systems describing how the other home entertainment systems are using the viewable moving image data~~; and

dynamically restructuring the broadcast of at least the selected channel, by at least restructuring the viewable moving image data of the selected channel, and without having to change allocated bandwidth to said selected channel, based on the ~~combined user behavior~~ information different types of viewable moving image data usage indicated in the combined events and generated user behavior information ~~describing how the viewable moving image data is being used~~ so as to optimize the use of the fixed bandwidth.

2. (Previously Presented) A method as recited in claim 1, wherein the combined user behavior information is anonymous such that the identities of the first home entertainment system and the other home entertainment systems are not disclosed.

3. (Original) A method as recited in claim 1, wherein said step for dynamically restructuring a broadcast is performed automatically.

4. (Currently Amended) A method as recited in claim 1, wherein said step for dynamically restructuring comprises at least one of:

modifying bandwidth of the broadcast;

~~changing modulation of the broadcast;~~

~~changing an encoding scheme of the broadcast;~~

varying parameters of the ~~encoding scheme of the broadcast~~;

interrupting the broadcast by allocating no bandwidth to the channel so as to entirely shut off the channel; and

~~redistributing the channel from a first transponder of a satellite television system to a second transponder of the satellite television system; and~~

receiving a guaranteed amount of bandwidth for the broadcast.

5. (Currently Amended) A method as recited in claim 1, further comprising the step for transmitting the coupled event and generated user behavior information for the first home entertainment system as feedback across a back channel from the first home entertainment

system to a signal source, wherein the coupled event and generated user behavior information is transmitted in one of real time and a deferred basis with respect to the broadcast of the channel.

6. (Currently Amended) A method as recited in claim 5, wherein a statistical analysis is performed at the signal source to determine when a statistically significant number of home entertainment systems have transmitted generated user ~~viewing~~ behavior information.

7. (Currently Amended) A method as recited in claim 1, further comprising the step for transmitting the coupled event and generated user behavior information as feedback across a back channel from the first home entertainment system to a clearinghouse system, wherein the generated user information is transmitted in at least one of (i) real time with respect to the broadcast of the channel and (ii) on a deferred basis with respect to the broadcast of the channel.

8. (Original) A method as recited in claim 7, wherein the clearinghouse system performs said step for combining.

9. (Currently Amended) A method as recited in claim 8, wherein a statistical analysis is performed at the clearinghouse system to determine when a statistically significant number of home entertainment systems have transmitted generated user behavior information.

10. (Currently Amended) A method as recited in claim 9, wherein the clearinghouse system processes the combined events and generated user behavior information and forwards the results to a signal source.

11. (Currently Amended) A method as recited in claim 10, wherein the processing performed at the clearinghouse system comprises associating the combined events and generated user behavior information with data from a data source.

12. (Original) A method as recited in claim 11, wherein the data source comprises an electronic programming guide that provides data as to at least one of a program and an advertisement.

13. (Original) A method as recited in claim 10, wherein the processing performed at the clearinghouse system comprises generating a profile of at least one of the home entertainment systems and the users.

14. (Original) A method as recited in claim 13, wherein the profile includes the programs of the broadcast to which the home entertainment systems are more frequently tuned compared to other programs of the broadcast.

15. (Original) A method as recited in claim 14, further comprising allocating increased bandwidth to the programs more frequently tuned.

16. (Original) A method as recited in claim 15, wherein the bandwidth is increased at an instant in time prior to the airing of the programs more frequently tuned.

17. (Original) A method as recited in claim 14, further comprising allocating increased bandwidth to channels of the broadcast to which the home entertainment systems are more frequently tuned.

18. (Currently Amended) In a system where a broadcast is output across a medium having a fixed bandwidth and is received by one or more individual home entertainment systems, the broadcast including a plurality of channels of viewable moving image data, a method for restructuring the broadcast based on feedback transmitted from the one or more home entertainment systems across one or more potentially unreliable back channels to a clearinghouse system, the method comprising the acts of:

receiving at the clearinghouse system an event and coupled user behavior information across a first communication link from a first home entertainment system, wherein the ~~user behavior information includes an event~~ was used to initiate ~~usage~~ tracking of a selected type viewable moving image data usage of for viewable moving image data of a selected channel, the selected type of viewable moving image data usage at the first home entertainment system being selected from among a plurality of different types of viewable moving image data usage that can be tracked each time one of the plurality of different types of viewable moving image data usage is utilized at the first home entertainment system ~~from among the plurality of channels, at the first home entertainment system coupled to related information identifying how the first home entertainment system is viewable moving image data, the user behavior information from the first home entertainment system describing how the first home entertainment system is using the viewable moving image data~~;

receiving at the clearinghouse system other events and coupled user behavior information across other communication links from other home entertainment systems, wherein ~~user behavior information from other home entertainment systems includes~~ the events were used to initiate usage tracking of selected types of the viewable moving image data usage for the viewable moving image data at the other home entertainment systems, the selected types of viewable

moving image data usage at the other home entertainment systems being selected from among the plurality of different types of viewable moving image data usage that can be tracked ~~coupled to corresponding related information identifying how the other home entertainment systems are using the selected channel the user behavior information from the other home entertainment systems describing how the other home entertainment systems are using the viewable moving image data~~;

combining at the clearinghouse system the event and coupled user ~~viewing~~ behavior information from the first home entertainment system with the events and coupled user ~~other~~ viewing behavior information from the other home entertainment systems, the combined events and coupled user behavior information indicating to describe how the different types of viewable moving image data usage is being ~~used~~ utilized in the system for the viewable moving image data; and

automatically restructuring the broadcast of at least the selected channel, by at least restructuring the viewable moving image data, and without having to change allocated bandwidth to said selected channel, based on analyzing the combined events and coupled user viewing behavior information indicating the different types of viewable moving image data usage utilized in the system for the viewable moving image data.

19. (Original) A method as recited in claim 18, wherein the first communication link and the other communication links are each back channels.

20. (Previously Presented) A method as recited in claim 19, further comprising the act of statistically determining at the clearinghouse system the reliability of the combined

user behavior information, wherein said act of automatically restructuring a broadcast is based on the statistical determination performed at the clearinghouse system.

21. (Currently Amended) A method as recited in claim 20, wherein the statistical determination performed at the clearinghouse system comprises determining when a statistically significant amount of viewing user behavior information has been received to cause the broadcast to be automatically restructured.

22. (Original) A method as recited in claim 19, wherein said act of automatically restructuring a broadcast comprises at least one of:

modifying bandwidth of the broadcast;

changing modulation of the broadcast;

changing an encoding scheme of the broadcast;

varying parameters of the encoding scheme of the broadcast;

interrupting the broadcast by allocating no bandwidth to the channel so as to entirely shut off the channel;

redistributing the channel from a first transponder of a satellite television system to a second transponder of the satellite television system; and

reserving a guaranteed amount of bandwidth for the broadcast.

23. (Original) A method as recited in claim 19, wherein said act of automatically restructuring a broadcast comprises allocating varying amounts of bandwidth of an MPEG data stream to the channel.

24. (Currently Amended) In a system where a broadcast is provided from a signal source across a medium having a fixed bandwidth and is received by one or more individual home entertainment systems, the broadcast including a plurality of channels having viewable moving image data, a method for optimizing the bandwidth by restructuring the broadcasting of one or more channels within the broadcast based on feedback transmitted from the one or more home entertainment systems to the signal source across one or more back channels, the method comprising the acts of:

transmitting a broadcast from a signal source to one or more home entertainment systems;

receiving at the signal source an event and coupled user behavior information across a first back channel from a first home entertainment system, wherein the ~~user~~ behavior ~~information from the first home entertainment system includes an~~ event was used to initiate ~~usage~~ tracking of viewable moving image data usage of a viewable moving image data ~~of~~ for a selected channel, the selected type of viewable moving image data usage at the first home entertainment system being selected from among a plurality of different types of viewable moving image data usage that can be tracked each time one of the plurality of different types of viewable moving image data usage is utilized ~~from among the plurality of channels of viewable moving image data,~~ at the first home entertainment system ~~coupled to related information identifying how the first home entertainment system is using viewable moving image, and wherein the first home entertainment system is one of the one or more home entertainment systems~~;

receiving at the signal source other events and coupled user behavior information across other back channels from other home entertainment systems, wherein ~~user behavior information~~

~~from other home entertainment systems includes~~ the events were used to initiate ~~usage~~ tracking of selected types of the viewable moving image data usage at the other home entertainment systems, the selected types of viewable moving image data usage at the other home entertainment systems being selected from among the plurality of different types of viewable moving image data usage that can be tracked ~~coupled to related information identifying how the other home entertainment systems are using the viewable moving image, and wherein the other home entertainment systems are of the one or more home entertainment systems~~;

combining the event and coupled user behavior information from the first home entertainment system with the other events and coupled user behavior information from the other home entertainment systems, the combined events and coupled user behavior information indicating to describe how the different types of viewable moving image data usage is being utilized ~~used~~ in the system for the viewable moving image data; and

automatically restructuring a broadcast of the selected channel, by at least restructuring the viewable moving image data, and without having to change the allocated bandwidth to said selected channel, based on analyzing the combined ~~viewing~~ events and coupled user behavior information indicating the different types of viewable moving image data usage utilized in the system for the viewable moving image data.

25. (Previously Presented) A method as recited in claim 24, wherein the user behavior information is received in real time across the first communication link with respect to a program broadcast on the selected channel.

26. (Previously Presented) A method as recited in claim 24, wherein the user behavior information is received on a deferred basis across the first communication link with respect to a program broadcast on the selected channel.

27. (Currently Amended) In a broadcast system, a computer program product for implementing a method for restructuring a broadcast based on feedback, wherein the broadcast originates from a signal source and is receivable by one or more of a plurality of home entertainment systems, the broadcast including a plurality of channels of viewable moving image data, the computer program product comprising:

a computer readable medium carrying computer program code means utilized to implement the method, wherein the computer program code means comprises executable code for implementing the acts of:

receiving at a clearinghouse system an event and coupled user behavior information across a first communication link from a first home entertainment system, wherein the ~~user behavior information includes an event~~ was used to initiate ~~usage tracking~~ of a selected type viewable moving image data usage for viewable moving image data of a selected channel, the selected type of viewable moving image data usage at the first home entertainment system being selected from among a plurality of different types of viewable moving image data usage that can be tracked each time one of the plurality of different types of viewable moving image data usage is utilized ~~from among the plurality of channels,~~ at the first home entertainment system ~~coupled to related information identifying how the first home entertainment system is using the viewable moving image data~~;

receiving at the clearinghouse system other events and coupled user behavior information across other communication links from other home entertainment systems, ~~wherein user behavior information from other home entertainment systems includes~~ the events were used to initiate ~~usage tracking~~ of selected types of ~~the~~ viewable moveable image data usage at the other home entertainment systems, the selected types of viewable moving image data usage at the other

home entertainment systems being selected from among the plurality of different types of viewable moving image data usage that can be tracked ~~coupled to related information identifying~~ how the other home ~~entertainment systems are using the viewable moving image~~ data;

combining the event and coupled user behavior information from the first home entertainment system with the ~~other~~ events and coupled user behavior information from the other home entertainment systems, the combined events and coupled user behavior information indicating ~~to describe how~~ the different types of viewable moving image data usage being utilized for the viewable moving image data ~~selected channel is being used~~ in the broadcast system; and

automatically restructuring the broadcast of the selected channel, by at least restructuring the viewable moving image data, and without having to change the allocated bandwidth to said selected channel, based on analyzing the combined events and coupled user ~~viewing~~ behavior information indicating the different types of viewable moving image data usage utilized in the system for the viewable moving image data.

28. (Original) A computer program product as recited in claim 27, wherein said first communication link and said other communication links are each back channels.

29. (Previously Presented) A computer program product as recited in claim 28, wherein the user behavior information is received in real time with respect to a program broadcast on the selected channel.

30. (Previously Presented) A computer program product as recited in claim 28, wherein the user behavior information is received on a deferred basis with respect to a program broadcast on the selected channel.

31. (Currently Amended) In a system that provides a broadcast across a medium having a fixed bandwidth to individual home entertainment system, the broadcast including one or more channels of viewable moving image data, a method for improving the broadcast based at least in part by feedback received from one or more of the home entertainment systems, the method comprising the acts of:

receiving a broadcast at a local signal source, wherein the broadcast is sent from a central signal source;

transmitting the broadcast to one or more home entertainment systems;

receiving at the local signal source an event and coupled user behavior information from at least one of the one or more home entertainment systems, wherein any events and coupled the user behavior information is received across a back channel, the user behavior ~~information~~ including any received events having been used to initiate ~~usage~~ tracking of a selected type of viewable moving image data usage for viewable moving image data of a selected channel, each selected type of viewable moving image data usage at the at least one of the one or more home entertainment systems being selected from among a plurality of different types of viewable moving image data usage that can be tracked each time one of the plurality of different types of viewable moving image data usage is utilized ~~from among the one or more channels, at the at least one home entertainment system coupled to related information identifying how the at least one home entertainment system is using the viewable moving image data~~;

combining the received events and corresponding user behavior information to indicate the different types of viewable moving image data usage being utilized for the viewable moving image data describe how the selected ~~channel is being used~~ in the system; and

transmitting a dynamically restructured broadcast to the one or more home entertainment systems, wherein the restructured broadcast is restructured by at least restructuring the viewable moving image data, without having to change allocated bandwidth to said selected channel, and is restructured based at least in part on the combined events and coupled user behavior information indicating the different types of viewable moving image data usage being utilized for the viewable moving image data ~~the description of how the selected channel is being used~~ in the system.

32. (Original) A method as recited in claim 31, wherein the broadcast is dynamically restructured at the local signal source.

33. (Original) A method as recited in claim 32, wherein the dynamic restructuring of the broadcast comprises at least one of:

modifying bandwidth of the broadcast;

changing modulation of the broadcast;

changing an encoding scheme of the broadcast;

varying parameters of the encoding scheme of the broadcast;

redistributing a channel from a first transponder of a satellite television system to a second transponder of the satellite television system; and

reserving a guaranteed amount of bandwidth for the broadcast.

34. (Previously Presented) A method as recited in claim 31, further comprising the acts of:

transmitting the viewing user behavior information to one of the central signal source and a clearinghouse system;

wherein said act of transmitting the user behavior information is performed before said act of transmitting a dynamically restructured broadcast; and

receiving the dynamically restructured broadcast.

35. (Original) A method as recited in claim 34, wherein the broadcast was dynamically restructured by at least one of:

a modification in bandwidth allocation;

a change in the modulation of the broadcast;

a change in an encoding scheme of the broadcast;

a modification in a parameter of the encoding scheme of the broadcast;

a redistribution of a channel from a first transponder of a satellite television system to a second transponder of the satellite television system; and

a reservation of a guaranteed amount of bandwidth for the broadcast.

36. (New) The method as recited in claim 1, wherein step for dynamically restructuring comprises at least one of:

changing modulation of the broadcast;

changing an encoding scheme of the broadcast;

varying parameters of the encoding scheme of the broadcast; and

redistributing the channel from a first transponder of a satellite television system to a second transponder of the satellite television system.

37. (New) The method as recited in claim 1, wherein the step for initiating usage tracking for a selected type of viewable moving image data usage for viewable moving image data of a selected channel comprises an a step for initiating usage tracking for selected type of viewable moving image data usage selected from among outputting the viewable moving image data and recording the viewable moving image.

38. (New) The method as recited in claim 37, wherein the step for initiating usage tracking for a selected type of viewable moving image data usage selected from among viewing the viewable moving image data and recording the viewable moving image comprises a step for initiating usage tracking for recording the viewable moving image data.

39. (New) The method as recited in claim 1, wherein the step for tracking utilization of a selected type of viewable moving image data usage for the viewable moving image data comprises a step for tracking utilization of recording the viewable moving image data.

40. (New) The method as recited in claim 1, wherein the step for combining the event and the generated user behavior information from the first home entertainment system with events and corresponding generated user behavior information from other home entertainment systems comprises an step for combining a first event and generated user behavior information indicating the viewable moving image data is being recording with a second event and generated user behavior information indicating the viewable moving image data is being output.

41. (New) The method as recited in claim 1, wherein the step for dynamically restructuring the broadcast of at least the selected channel comprises a strep for restructuring the broadcast based on the combined events and generated user behavior information indicating that at least one home entertainment system is recording the viewable moving image data and at least one home entertainment system is outputting the viewable moving image data.

42. (New) The method as recited in claim 1, wherein the step for initiating usage tracking for a selected type of viewable moving image data usage for viewable moving image data of a selected channel comprises an a step for initiating usage tracking for a selected type of viewable moving image data usage that indicates how the viewable moving image data is being used.